



STATE FOREST LAND RESOURCE ASSESSMENT ACTIVITIES

This information is provided as a courtesy by the Michigan Department of Natural Resources.

The Michigan Department of Natural Resources (DNR) conducts a wide variety of activities (called treatments) on State lands, from scheduled forest improvement and harvesting cycles to road and bridge projects, mineral leasing and development, or recreational facility improvement. Every time the Michigan DNR plans to conduct these kinds of treatments on State Forest lands, it must go through a process that assesses how those proposed treatments will impact the land. Members of the public who are interested in when, where and why these treatments take place can learn about the particular process and where to get related information through this document. The Michigan DNR staff may also want to consult this document when they want a simple checklist guide when proposing treatments. [Resource assessments](#) for timber sale harvests and wildlife management activity are routinely included as part of the Michigan DNR [compartment review](#) process. Many other types of activities have unique procedures that Michigan DNR staff must follow.

General Procedure:

The following actions are conducted by the Michigan DNR to assess environmental impacts and document activities (called [treatments](#)) and observations. These actions apply to all proposed treatments on [certified](#) State Forest land. Although most treatments go through a compartment review, some have an alternate process which is defined either by statute or by a special Michigan DNR Procedure. Refer to Figure 1, titled the "Resource assessment process at a glance", for a graphic description of this generalized procedure. Refer to Appendix A for details on available records and primary contacts for each checklist item.

Planning Checklist:

1. Check to make sure the proposed treatment fits within the goals and limitations of other Michigan DNR management plans and guidance documents.

Plans may include:

- Compartment review decisions (including pre-inventory meeting objectives)
- Wildlife Action Plan
- Off-Road Vehicle Plan
- Eco-Regional State Forest Management Plans
- Statewide Forest Management Plan
- Special Conservation Area plans
- Other local plans

Guidelines may include:

- Sustainable Soil and Water Quality Practices on Forest Land
- Forest certification work instructions
- Michigan DNR silvicultural guidelines
- [Within-Stand Retention](#) guidelines
- [Green-up](#) guidelines

2. Check the [Michigan Natural Features Inventory](#) (MNFI) database for potential areas of concern. Review any concerns with the Michigan DNR's Endangered Species Coordinator. Request special surveys where staff has determined there is a high likelihood of finding a rare species within a proposed treatment area. Survey results are available from the Forest, Mineral, and Fire Management (FMFM), Forest Resource Section in Lansing.
3. Check the Department of History, Arts, and Libraries (HAL) database for potential areas of concern. This includes such things as historic structures or archaeological sites. Investigate concerns with the Office of the State Archeologist (OSA) and/or the Statewide Historic Preservation Officer (SHPO). Request special surveys or other follow-up activities as needed.
4. Conduct a preliminary meeting with divisions within the Michigan DNR who are involved in developing or implementing treatments.

5. Notify Tribal Historic Preservation Officers (THPO) of Michigan DNR treatments involving federal funds that may affect cultural resources of concern to the tribes. Division Coordinators are available to assist with notifications in their respective divisions. Request special surveys or other follow-up activities as needed.
6. Gather input for the proposed treatment from interested associations, advisory groups, interest groups and the broader public. Associations and advisory groups for major program areas typically include fire, recreation activities (e.g., motorized trail users, hunting interests), timber, wildlife and fisheries management interests.

Operations Checklist:

7. (a.) Prepare treatment proposals, and (b.) seek approval for the proposed treatment activity using appropriate Michigan DNR procedures.
8. Conduct treatments outlined in the field proposals using professional staff (e.g., Michigan DNR foresters/forest technicians and/or wildlife biologists/technicians). Treatments must match the approved prescribed activities.
9. Issue appropriate permit or contract (if applicable) to conduct treatments. This includes treatment specifications to protect environmental and archaeological/historic features.
10. Conduct and document field inspections while treatment activities are being carried out. File documented work with associated permit, contract, or proposal. Report any rare, threatened or endangered species or archaeological/historic features found during treatment activities.
11. Document completed activities or treatments and conduct final activity inspection to verify that activities have followed the planned and approved prescriptions.
12. Integrate treatment results into appropriate plans and databases.

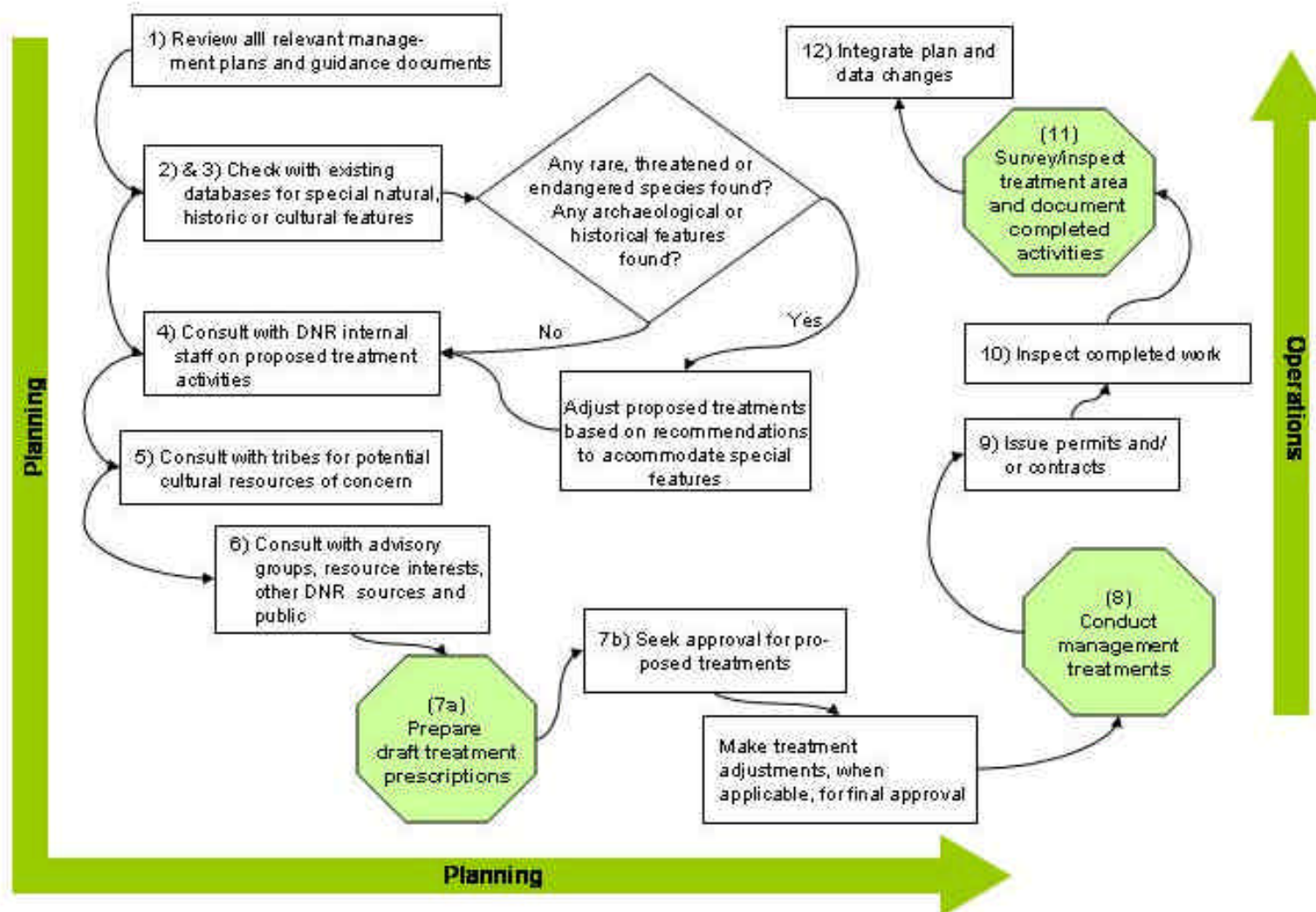


Figure 1. Assessment process at a glance.

Compartment Reviews on State Forest Lands

Michigan's 3.9 million acres of State Forests are complex and interconnected systems that are extremely important to a variety of needs in the State, from wood products to ecosystem health to recreational pursuits of all stripes. This forest complexity requires careful planning, prescribing activities that ultimately maintain a healthy and sustainable resource.

Gathering knowledge and interests from citizens and various natural resource professionals is an important component of the forest management planning process. The Michigan DNR foresters want to have a thorough picture of current and potential future conditions before conducting any harvesting, planting or other activity.

There are 15 [Forest Management Units](#) (FMU) in the State Forest system. To make management of timber and wildlife resources on State Forests more systematic, the land in each FMU is divided into smaller units called *compartments*. Each compartment, consisting of 1,500 to 3,000 acres of State Forest land, is reviewed every 10 years for potential management activity. This process in its entirety is called a *compartment review*. It is the formal, standardized process for decision-making regarding the majority of on-the-ground State Forest land treatment activities. It is also the forum for the public to be advised of, comment on, or propose treatments and actions. Note that other types of treatments, such as mineral leasing, use permits, recreation projects, road and bridge work, use different processes that follow the general checklist outline.

Compartment reviews take place in three major phases: planning, on-the-ground activity (called *operations*), and monitoring. The overall process is outlined below, followed by a summary diagram (Figure 2). The Michigan DNR website (www.michigan.gov/dnr) also includes information for public review, including:

- open house and compartment review schedules,
- locations of compartments by year of entry,
- compartment review documents,
- Michigan DNR plans,
- Michigan DNR procedures, and other information.

Compartment Review Step	Purpose/Explanation	Primary Contact
1. Conduct pre-inventory meeting	About 1 year before field activities take place (called Year of Entry), meet to assure the upcoming year's compartments are placed within a long-term, landscape context prior to the start of the forest inventory.	Compartment's FMU manager
2. Conduct field inventory	Foresters gather past inventory data and then visit, record biological data and map by tree species all the State-owned land in the compartment.	FMU manager
3. Obtain and evaluate environmental information on special features: <ul style="list-style-type: none">• Rare species• Cultural resources• Comments from DEQ• Habitat plans• Other Michigan DNR programs	Information on rare, threatened & endangered species is gathered from the MNFI database. Cultural & archaeological resources are identified through HAL. Rare species habitat plans, such as the Kirtland Warbler plan, are also incorporated in the review if necessary. Alignment with wild and scenic rivers and minerals guidelines (where applicable) is also outlined.	FMU manager, Michigan DNR Endangered Species Coordinator, Office of State Archaeologist
4. Propose and assess prescribed management activities (treatments)	Forester makes initial recommendations for treatments, including such activities as clear cutting, selective thinning, prescribed fire, tree planting or no treatment at all.	FMU manager, Timber Management Specialist
5. Conduct pre-review meeting	Reach consensus among all Michigan DNR resource managers on prescribed treatments	FMU manager

Compartment Review Step	Purpose/Explanation	Primary Contact
6. Host open house	All affected Michigan DNR divisions are available to interested publics to discuss issues and preliminary prescriptions. This is an informal event that is scheduled in part during standard non-work hours. <i>All members of the public are encouraged to provide input on the proposed compartment activities, either during the open house or directly to the FMU manager.</i>	FMU manager and program staff
7. Consult with tribes and Michigan DNR advisory committees	All 12 federally recognized Michigan tribes are consulted on all activities, as well as various standing advisory committees.	FMU manager and program staff
8. Conduct compartment review meeting	Michigan DNR personnel meet to examine the compartment, reviewing current conditions and agreeing on proposed treatments - which includes input from the open house, tribes and advisory committees. <i>This meeting is also open to interested members of the public.</i>	FMU Manager and Forest Inventory & Planning Specialist
9. Provide opportunity for appeal	After the results from the compartment review have been compiled, compartment review meeting participants may appeal the decision within 45 days of the review meeting.	Michigan DNR Field Deputy
10. Prepare to conduct prescribed treatments in the field	Recommended treatments are arranged in the field, matching agreed-upon compartment review prescriptions. All required proposals, checklists and permits are completed.	FMU Manager
11. Conduct management activities in the field	Michigan DNR field staff conduct routine field inspections as contracted work is conducted, including timber harvests, thinnings, tree plantings, and wildlife and fisheries habitat improvement.	FMU Manager
12. Inspect and document completed treatments	Michigan DNR field staff verify that treatments have been completed according to prescriptions. All databases are updated to reflect new field conditions.	Michigan DNR Timber Management Specialist, Forest Health Specialist
13. Continue cooperating with other agencies, committees and teams		

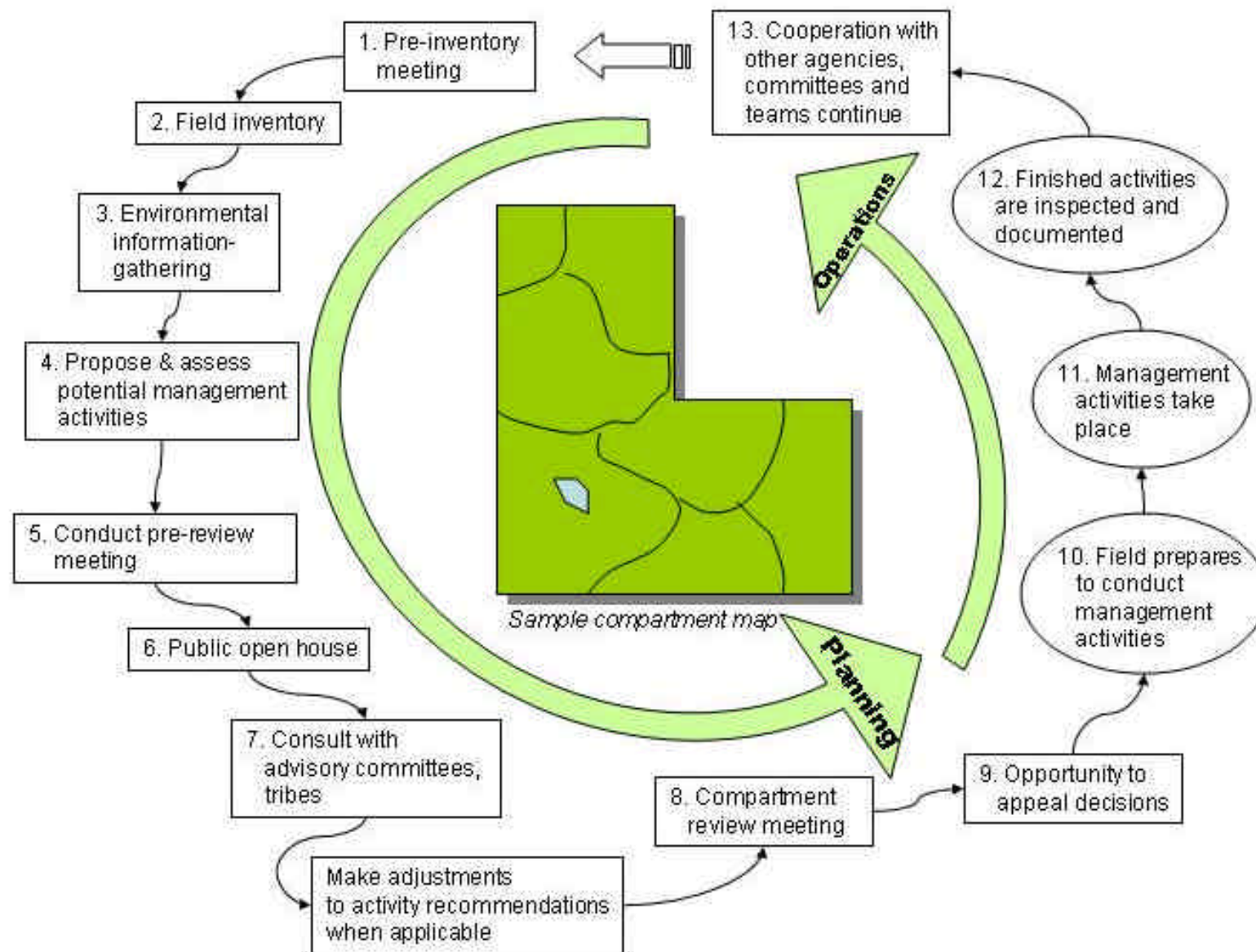


Figure 2. Compartment review process flow chart.

Appendix A: Environmental Analysis and Assessment – Records and Primary Contacts

Assessment Steps	Type of Process	Where can the public view the information?		Primary Contact
		Records	File Location	Other contacts
1. Conformance with plans and guidance documents	Compartment review	<ul style="list-style-type: none"> • Pre-Inventory Meeting • Pre-Review Meeting • Compartment Review Decisions 	<ul style="list-style-type: none"> • Communication intended for internal Michigan DNR use. Meeting notes may be available. • Communication intended for internal Michigan DNR use. Decisions are incorporated into proposed compartment review prescriptions. • Available upon request; subset is posted on website as part of compartment review information. 	<ul style="list-style-type: none"> • Forest Management Unit (FMU) Manager • FMU Manager • FMU Manager, District Inv & Planning Specialist Wildlife Biologist
	Forest Planning	<ul style="list-style-type: none"> • Statewide Forest Management Plan • Regional State Forest Management Plans • Ecoregional Management Plans • Wildlife Action Plan • ORV Management Plan • Special Conservation Areas plans or other Local Forest Management Plans 	<ul style="list-style-type: none"> • Posted on Michigan DNR website, available on request. • Posted on website when draft or plan is complete, available on request. • Posted on website when draft or plan is complete, available on request. • Posted on website, available on request. • Draft is posted on website, available on request. • Available on request. 	<ul style="list-style-type: none"> • FMFM Forest Resource Management Section • FMFM District Planning and Inventory Specialist • FMFM District Planning and Inventory Specialist • Michigan DNR Wildlife Division • FMFM Recreation Section Manager • FMU Manager
	Guidance Documents	<ul style="list-style-type: none"> • Sustainable Soil and Water Quality Practices on Forest Land • Forest Certification Work Instructions • Michigan DNR and Division Policy and Procedures • Silvicultural Mgt Guidelines • Within-stand Retention Guidelines 	All are posted on Michigan DNR website and are available on request.	FMFM Forest Resource Management Section

Assessment Steps	Type of Process	Where can the public view the information?		Primary Contact
		Records	File Location	Other contacts
		<ul style="list-style-type: none"> Green-up Guidelines 		
2a. Obtain and evaluate environmental information on rare species	Planning	<ul style="list-style-type: none"> OI Database Stage 1 IFMAP Stage 2 IFMAP MNFI Compartment Review Ecologist Reports Survey Reports Habitat Plans for rare species 	Generalized information from compartment review meeting posted on Michigan DNR website ; - Site specific data placed in locked comments - NOT available to the public.	<ul style="list-style-type: none"> Michigan DNR Endangered Species Coordinator FMU Manager
3a. Obtain and evaluate information on Cultural Resources	Planning	<ul style="list-style-type: none"> OI Database Stage 1 IFMAP Stage 2 IFMAP Survey Reports Form PR 4440 	Generalized information from compartment review meeting posted on Michigan DNR website ; - Site specific data placed in locked comments - NOT available to the public.	<ul style="list-style-type: none"> Office of State Archaeologist FMU Manager
2b./3b. Request special survey for rare species or cultural resources	Planning	Rare Species Survey Request	FMFM Section for Forest Resources Management	<ul style="list-style-type: none"> Section Manager for FMFM Forest Resource Management Section Michigan DNR Endangered Species Coordinator
4. Conduct preliminary meeting with Michigan DNR Divisions	Planning	<ul style="list-style-type: none"> Meeting notes Correspondance Verbal consultations may not be documented 	Varies with the type of treatment being proposed	FMU Manager
5. Notify Tribal Historic Preservation Officers	Planning	Correspondence	Tribal Coordinator for initiating Division	Tribal Coordinator from initiating Division
6. Public Input	Planning	<ul style="list-style-type: none"> Meeting Minutes Correspondence 	Varies depending upon group or agency. Many are posted on the website or available upon request.	<ul style="list-style-type: none"> FMFM Resource Management Section FMU Manager,

Assessment Steps	Type of Process	Where can the public view the information?		Primary Contact
		Records	File Location	Other contacts
				<ul style="list-style-type: none"> Meeting Chair person
7. Prepare Treatment Proposals and obtain approval for Intrusive Activities	Operations	<ul style="list-style-type: none"> Forest Treatment Proposals (FTP), form R 4048 E Timber Sale Pre-Sale Checklist (Appendix C), form R 4031-6, Timber Sale Proposal Land Use and Event Permits, form R-1138-3 Pesticide Application Plans, form R 4029, Other Permits - i.e. DEQ 	FMU Office - Compartment Files	<ul style="list-style-type: none"> FMU Manager, or Initiating Division Manager for Intrusive Operations
8. Field Preparation of Treatments	Operations	Same as in 7 above	FMU Office - Compartment Files	<ul style="list-style-type: none"> FMU Manager, or Initiating Division Manager for Intrusive Operation Field Staff
9. Issue permit or contract for intrusive activity	Operations	<ul style="list-style-type: none"> Timber Sale Contracts Land Use and Permits: form R 1138, R 1138-1, R-1138-2, R-1138-4 Other permits or contracts 	FMU Office	FMU Manager
10a. Report observed rare species	Operations	Correspondence	FMFM Section for Forest Resources Management	<ul style="list-style-type: none"> Michigan DNR Endangered Species Coordinator FMU Manager
10b. Report discovered cultural site	Operations	Michigan DNR/HAL Form R4440, "Archaeological and Cultural Sites Reporting"	FMFM Section for Forest Resources Management	<ul style="list-style-type: none"> Office of State Archaeologist for cultural resources FMFM Section Manager for Forest Resources Management

Assessment Steps	Type of Process	Where can the public view the information?		Primary Contact
		Records	File Location	Other contacts
10c. Request special survey, if appropriate	Operations	Rare Species Survey Request or Cultural Resources Survey Request	FMFM Section Manager for Forest Resources Management	<ul style="list-style-type: none"> • FMFM Section Manager for Forest Resources Management • Michigan DNR Endangered Species Coordinator for rare species • Office of State Archaeologist for cultural resources
10d. Field Administration of Treatments	Operations	<ul style="list-style-type: none"> • Timber Sale Inspection: Field Inspection Reports (R 4050) • Natural and Artificial Regeneration Reports • Land Use and Permits: form R 1138, R 1138-1, R-1138-2, R-1138-4 • Other permits - i.e. DEQ 	FMU Office	<ul style="list-style-type: none"> • FMU Manager • or Initiating Division Manager for Intrusive Operations
11. Documentation of Completed Treatments	Operations	<ul style="list-style-type: none"> • Timber Sale Completion Reports (TCR) • Forest Treatment Proposal Completion Reports, form R 4048-1E: • Pesticide Use Evaluation Report (PUER), form R 4029-1: • updated OIPC/IFMAP database • Open Sale Report on Michigan DNR Intranet. 	FMU Office Michigan DNR Intranet	FMU Manager

Appendix B: Additional Information on Protection and Management of Endangered, Threatened, or Special Concern Species

Two work instructions and two sets of guidelines provide guidance to the Michigan DNR for the protection and management of endangered, threatened and special concern species (rare species) on Michigan DNR State Forest lands:

- Work Instruction 1.4 Biodiversity Conservation on State Forest Land
http://www.michigan.gov/documents/RevisedbiodiversityWI8_134556_7.19.05.pdf
- Conservation Area Management Guidelines (pages 6-9)
http://www.michigan.gov/documents/ConservationAreaMgtGuidelines_162564_7.pdf
- Work Instruction 3.1 Forest Operations http://www.michigan.gov/documents/3_133210_7.1.pdf
- Michigan DNR Approach to the Protection of Rare Species and Rare Species Assessment Guidelines for Michigan DNR Staff on State Forest Lands, July 12, 2006 (See Appendix B).

To protect and manage rare species on Michigan DNR State Forest Lands, Michigan DNR:

- Avoids the taking of threatened and endangered species (T/E) species.
- Treats special concern (SC) and Candidate Conservation species, when and where possible, with similar management consideration as T/E species.
- Protects, maintains, and/or enhances rare species (T/E/SC) health and habitat.
- Refers all conflicts or potential conflicts regarding management of rare species to the Department's Endangered Species Coordinator.
- Does not share data on specific locations of T/E species in public documents.
- Initiates and completes field surveys for rare species when there is a high probability for a rare species to be in or near a proposed treatment.
- Files field survey results with MNFI, and references to the survey are recorded in the forest inventory data base and noted on timber sale and forest treatment proposals, if applicable.

Appendix C: Additional Information on Cultural Resources Management and Protection

Cultural resources constitute an important facet of Michigan's heritage. Responsible land management ensures that significant cultural resources are recognized and potential impacts to those resources taken into account during planning, and minimizing any potential damage to those resources.

Cultural resources are defined as being at least 50 years old and could include buildings, structures such as bridges, shipwrecks, and archaeological sites. Archaeological sites are places that preserve physical remains of past human activity. In Michigan, archaeological sites may be as much as 12,000 years old. The most commonly found cultural resources on forested land are Native American camps, burial mounds, abandoned homesteads, old logging camps, CCC camps, and structures such as dams and bridges. Not all cultural resources are significant. It is the role of the Michigan Department of History, Arts, and Libraries (HAL) to determine the significance of cultural resources.

To protect and manage archaeological and historic sites on State Forest Lands, the Michigan DNR:

- Protects, maintains, and/or enhances significant cultural, historic, and archaeological sites.
- Consults with the State Historic Preservation Office (SHPO) and the Office of the State Archaeologist (OSA) of HAL concerning the management of cultural resources on forest lands.
- Sends compartment review information to HAL, Office of the State Archaeologist (OSA) and the State Historic Preservation Officer (SHPO), for evaluation of proposed treatments and identification of areas of concern.
- Refers and investigates all potential conflicts involving physical alterations to standing structures (buildings, bridges, dams etc) over 50 years old with the SHPO.
- Checks the HAL CONCERNS database to determine whether there are concerns related to site disturbing activities not reviewed and approved through the compartment review process.
- Reports all observed or potentially significant cultural resources to HAL using form PR 4440 (Archaeological and Cultural Sites Reporting Form).
- Refers and investigates potential conflicts regarding management of significant archaeological resources with the Office of the State Archaeologist.
- Notifies Tribal Historic Preservation Officers (THPO) of Michigan DNR undertakings involving federal funds that may affect tribal cultural resources of concern to the tribes.
- Does not share data on specific locations of cultural/historic/archaeological sites in public documents, in accordance with the exemption allowed in the State Freedom of Information Act.

Michigan DNR and Other State Staff Contacts

Office/Position	Contact
Baraga Management Unit	427 US-41 North Baraga MI 49908 (906) 353-6651
Crystal Falls Management Unit	1420 US-2 West Crystal Falls MI 49920 (906) 875-6622
Gwinn Management Unit	410 West M-35 Gwinn MI 49841 (906) 346-9201
Escanaba Management Unit	6833 Hwy 2, 41 & M-35 Gladstone MI 49837 (906) 786-2354
Shingleton Management Unit	M-28 West, PO Box 67 Shingleton MI 49884 (906) 452-6227
Newberry Management Unit	Box 428 Newberry MI 49868 (906) 293-3293
Sault Ste. Marie Management Unit	Box 798 2001 Ashmun Sault Ste Marie MI 49783 (906) 635-5281
Gaylord Management Unit	1732 West M-32 Gaylord MI 49735 (989) 732-3541
Atlanta Management Unit	13501 M-33 Atlanta MI 49709 (989) 785-4251
Pigeon River Country Management Unit	9966 Twin Lakes Rd Vanderbilt MI 49795 (989) 983-4101
Traverse City Management Unit	970 Emerson Traverse City MI 49686 (231) 922-5280
Roscommon Management Unit	Box 218 Roscommon MI 48653 (989) 275-4622
Grayling Management Unit	1955 N I-75 BL Grayling MI 49738 (989) 348-6371
Gladwin Management Unit	801 N Silverleaf Gladwin MI 48624 (989) 426-9205
Cadillac Management Unit	8015 Mackinaw Trail Cadillac MI 49601 (231) 775-9727

Glossary

Certified/certification: A formal review by an independent third party of on-the-ground forest practices against standards that address environmental, social and economic issues. The Michigan DNR State Forest lands were certified in 2005 under both the Sustainable Forestry Initiative (SFI) and the Forest Stewardship Council (FSC) certification programs. [\[go back\]](#)

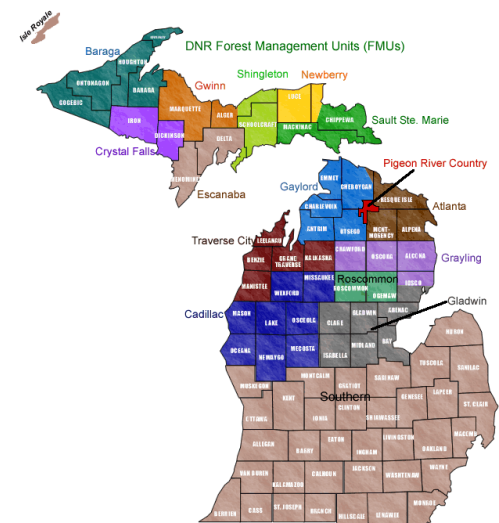
Compartment review: A compartment is a block of State forestland that ranges from 1,500 to 3,000 acres in size. Each compartment is systematically reviewed for potential treatments (i.e., management practices) every 10 years. [\[go back\]](#)

Forest treatments: Activities taken to modify the composition or structure of a forest stand to meet management objectives. Such activities include commercial thinning or clearcut harvests, prescribed burns, removal of undesired species, regeneration or understory planting, and deliberate inaction. [\[go back\]](#)

Eco-region: Areas of relatively homogeneous ecological systems. Eco-regions are usually based on patterns of land use, topography, present and potential natural vegetation and soils.

Eco-unit: Geographic areas containing similar ecological patterns and processes whose boundaries closely align with the State's eco-regions. In Michigan, the Michigan DNR has designated 4 eco-regions: Western Upper Peninsula, Eastern Upper Peninsula, Northern Lower Peninsula, and Southern Lower Peninsula. They were established for organizing and administering assessment, planning, facilitating, and updating of regional ecosystem management activities.

Forest Management Unit (FMU): A geographically contiguous portion of State Forest land, each covering multiple counties. There are 15 FMUs in the State Forest system, with 7 located in the Upper Peninsula and 8 in the Northern Lower Peninsula. See diagram to the right. [\[go back\]](#)



Green-Up Requirement: Previously clearcut harvest areas must have trees at least 3 years old or 5 feet high at the desired level of stocking before adjacent areas are clearcut (2005-2009 Sustainable Forestry Initiative® Standard). [\[go back\]](#)

IFMAP: The acronym stands for Integrated Forest Monitoring, Assessment, and Prescription system. It is a GIS-based inventory system that differentiates the forest according to tree canopy composition and non-forested areas by plant composition. Stand lines are drawn based upon vegetative composition, and not based upon management objectives. Management boundaries (proposed treatments, Special Conservation Areas, etc) are delineated separate from the vegetative inventory.

Landscape: An area composed of adjacent and interacting ecosystems that are related because of geology, land forms, soils, climate, biota, and human influences.

Michigan Natural Features Inventory (MNFI): A branch of MSU Extension that "...actively contributes to decisions that impact the conservation of biological and ecological diversity by collecting, analyzing, and communicating information about rare and declining plants and animals, and the array of natural communities and ecosystems native to Michigan." [\[go back\]](#)

Operations: The act or process that executes actual activities on State lands. [\[go back\]](#)

Resource assessment: A systematic effort to determine whether a given area meets a set of conditions to justify performing prescribed treatments or activities. [\[go back\]](#)

Stand: Typically the smallest unit on which management activities take place. It can be distinguished from adjacent stands by a number of parameters, including species composition, age, stocking density, diameter of trees, health, site index, management objectives and treatments.

Stand retention: A set of guidelines designed to outline the process to retain both live and standing dead trees in stands scheduled for harvest treatments. [\[go back\]](#)

Year of Entry: The specific year that operations are scheduled to take place in a State Forest compartment. [\[go back\]](#)